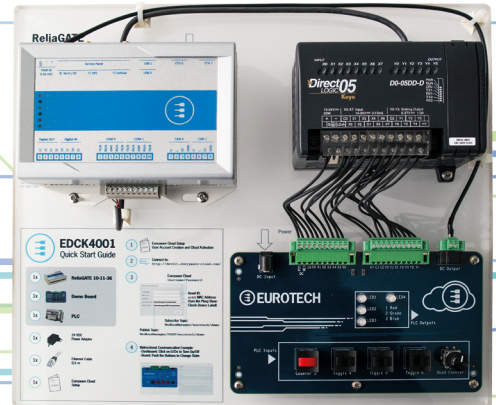


## EDCK 4001

- For Embedded, IT and OT Developers
- Hands-on Learning
- Preinstalled End-to-End IoT Application
- Simulation of Industrial Use Cases
- All-inclusive and Ready to Go



## FEATURES

**Production Grade** - Leverages production-grade hardware, software and services to provide a familiar development environment to Embedded, IT and OT developers

**Hands-on Learning** - Shows every building block of a sophisticated IoT/M2M application, how to create a bidirectional connection with the Cloud and how to do remote management

**Preinstalled IoT Application** - Provides a real-world example where a Gateway and a PLC are used to create a link between the Cloud and the Field

**Simulation of Industrial Use Cases** - Includes support for ModBus and a PLC, it is designed to be expandable beyond the included example, and to interface with other user devices

**All-inclusive and Ready to Go** - Packages HW, SW, a Cloud license and accessories to get started immediately

The EDCK 4001 is a Development Kit for Everyware Device Cloud that provides a learning environment and a testbed for IoT/M2M applications; it targets professional developers with an Embedded, IT or OT background.

Creating an End-to-End solution typically requires bridging Field devices with Cloud-based services; the EDCK 4001 replicates a complete scenario, in which the field devices are simulated by a panel that provides some data sources and receivers (buttons, LEDs, etc). The bidirectional data and command flow between the Cloud and the Field is managed by a Gateway, which is connected to a PLC that controls the panel.

The preinstalled IoT application shows how to implement a complete solution, including remote device management and OTA package deployment.

The EDCK 4001 includes a ReliaGATE 10-11, Eurotech's IoT Gateway for industrial applications based on the TI AM335X Cortex-A8 (Sitara) processor family, with 512MB of RAM, 4GB of eMMC and a user-accessible microSD slot.

The ReliaGATE 10-11 comes with a genuine Oracle Java SE Embedded 8 Virtual Machine and Everyware Software Framework (ESF), a commercial, enterprise-ready edition of Eclipse Kura, the open source Java/OSGi middleware for IoT gateways.

Distributed and supported by Eurotech, ESF adds advanced security, diagnostics, provisioning, remote access and full integration with Everyware Cloud (EC), Eurotech's IoT integration platform.

A trial EC license is also included, providing advanced services like data retention and retrieval, analytics, dashboarding, VPN and device management, including OTA updating.

EDCK 4001 also includes a professional Reactive Blocks™ by Bitreactive trial license, a visual tool for developing reactive or event driven applications for IoT/M2M or other embedded systems.

## Specifications

Ordering code: REGATE-10-11-36-DK00

### GATEWAY

PROCESSOR	<b>CPU</b>	TI AM3352 800MHz, 1 core
MEMORY	<b>RAM</b>	512MB DDR3
STORAGE	<b>Embedded</b>	4GB eMMC, microSD Slot (User Accessible)
I/O INTERFACES	<b>Ethernet</b>	2x 10/100Mbps
	<b>USB</b>	3x Host 2.0 (Noise and Surge Protected)
	<b>Serial</b>	2x RS-232/RS-485 (Surge protected, RS-485 termination and Fail-safe Resistors) - 1x Serial Console TTL
	<b>CAN 2.0B</b>	2x CAN bus with 5V (100mA) Power Out
	<b>Digital I/O</b>	2x Digital Input 5V (TTL), 1KV optoisolated - 2x Digital Output (40VDC), 30mA sink
RADIO INTERFACES	<b>Cellular</b>	Optional with ReliaCELL
	<b>GPS</b>	Optional with ReliaCELL
	<b>Wi-Fi / BT</b>	b/g/n, BLE
POWER	<b>Input</b>	9-36VDC, with Transient Protection, Vehicle Ignition Sense
	<b>Consumption</b>	2W Idle (15W Max)
OTHER	<b>RTC</b>	Yes (User Accessible Battery)
	<b>Ext. watchdog</b>	Yes
	<b>Sensors</b>	Temperature, Accelerometer
	<b>LEDs</b>	1x Power, 4x Programmable
	<b>Buttons</b>	1x Reset, 1x Programmable
	<b>SIM slot</b>	No

### GATEWAY SOFTWARE

OS	Yocto Linux 1.6 – Kernel 3.14
SDK	Yocto-based Eclipse Tooling
IoT FRAMEWORK	Oracle Java SE Embedded Version 8 - Everyware Software Framework (Java/OSGi)

### TRIAL LICENSES

CLOUD	Everyware Cloud Trial License
SDK	Reactive Blocks by Bitreactive Trial License

### ACCESSORIES

PLC	DirectLOGIC DL05
DEMO BOARD	1x Momentary Button, 3 ON/OFF Buttons, 3x LEDs, 1x RGB LED, 1x Quad Counter
POWER SUPPLY	24VDC Power Supply Unit at 24W
	Power Blades for Wall Mount Adapter (US, JP, EU, UK)
ANTENNAS	Internal Dipole Wi-Fi / Bluetooth ( 2,4 / 5 GHz ) Antenna with RP-SMA connector
DATA CABLES	Ethernet cable (0.5m) with RJ45
	USB to Serial TTL Cable converter (Debug Port)
MOUNTING	Wall Mount Bracket (Aluminum)

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